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| APPLICATION NO.     | APPLICATION NO. FILING DATE |                    | FIRST NAMED INVENTOR        | ATTORNEY DOCKET NO. | CONFIRMATION NO. |  |
|---------------------|-----------------------------|--------------------|-----------------------------|---------------------|------------------|--|
| 09/848,465          | 09/848,465 05/03/2001       |                    | Igor Philip Passos Proglhof | J&J-1735            | 6958             |  |
| 27777               | 7590                        | 02/12/2004         |                             | EXAMINER            |                  |  |
| PHILIP S.           |                             |                    | STEPHENS, JACQUELINE F      |                     |                  |  |
| JOHNSON<br>ONE JOHN |                             | ON<br>DHNSON PLAZA | ART UNIT                    | PAPER NUMBER        |                  |  |
| NEW BRU             | NSWICK,                     | NJ 08933-7003      | 3761                        | 16                  |                  |  |

DATE MAILED: 02/12/2004

Please find below and/or attached an Office communication concerning this application or proceeding.

PTO-90C (Rev. 10/03)

|   |  | Application No.  | Applicant(s)  |              |  |  |  |  |  |
|---|--|--|---|--------------|--|--|--|--|--|
|   |  | 09/848,465   | PROGLHOF ET AL  |              |  |  |  |  |  |
|   | Office Action Summary  | Examiner   | Art Unit  |              |  |  |  |  |  |
|   | ·  | Jacqueline F Stephens  | 3761  |              |  |  |  |  |  |
| Period fo   | The MAILING DATE of this communication app<br>r Reply  | ears on the cover sheet wit  | th the correspondence add   | iress        |  |  |  |  |  |
| THE N - Exten after S - If the - If NO - Failur Any n   | DRTENED STATUTORY PERIOD FOR REPLY MAILING DATE OF THIS COMMUNICATION. Issions of time may be available under the provisions of 37 CFR 1.13 SIX (6) MONTHS from the mailing date of this communication. Period for reply specified above is less than thirty (30) days, a reply period for reply is specified above, the maximum statutory period or to reply within the set or extended period for reply will, by statute eply received by the Office later than three months after the mailing of patent term adjustment. See 37 CFR 1.704(b). | 36(a). In no event, however, may a re<br>y within the statutory minimum of thirty<br>vill apply and will expire SIX (6) MONT<br>, cause the application to become AB | oply be timely filed  (30) days will be considered timely  (HS from the mailing date of this co | mmunication. |  |  |  |  |  |
| Status  |  |  |   |              |  |  |  |  |  |
| 1)🖂   | Responsive to communication(s) filed on 31 D   | ecember 2003.  |   |              |  |  |  |  |  |
| 2a) <u></u> ☐   | This action is <b>FINAL</b> . 2b)⊠ This  | action is non-final.   |   |              |  |  |  |  |  |
|   | Since this application is in condition for allowance except for formal matters, prosecution as to the merits is  |  |   |              |  |  |  |  |  |
|   | closed in accordance with the practice under Ex parte Quayle, 1935 C.D. 11, 453 O.G. 213.  |  |   |              |  |  |  |  |  |
| Disposition of Claims   |  |  |   |              |  |  |  |  |  |
| 4) Claim(s) is/are pending in the application.  |  |  |   |              |  |  |  |  |  |
| • —   | 4a) Of the above claim(s) <u>1-14</u> is/are withdrawn from consideration.   |  |   |              |  |  |  |  |  |
| 5)□   | 5) Claim(s) is/are allowed.  |  |   |              |  |  |  |  |  |
| 6)⊠   | 6)⊠ Claim(s) <u>1-14</u> is/are rejected.  |  |   |              |  |  |  |  |  |
| 7)  | Claim(s) is/are objected to.   |  |   |              |  |  |  |  |  |
| 8)□   | Claim(s) are subject to restriction and/o  | r election requirement.  |   |              |  |  |  |  |  |
| Applicati   | on Papers  |  |   |              |  |  |  |  |  |
| 9)□ '   | The specification is objected to by the Examine  | er.  |   |              |  |  |  |  |  |
| 10) The drawing(s) filed on is/are: a) accepted or b) objected to by the Examiner.  |  |  |   |              |  |  |  |  |  |
| <i>/</i> —  | Applicant may not request that any objection to the  |  |   |              |  |  |  |  |  |
| Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).          |  |  |   |              |  |  |  |  |  |
| 11) The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.                      |  |  |   |              |  |  |  |  |  |
| Priority u  | ınder 35 U.S.C. § 119  |  |   |              |  |  |  |  |  |
|   |  |  |   |              |  |  |  |  |  |
| 12)⊠ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).  a)⊠ All b)□ Some * c)□ None of: |  |  |   |              |  |  |  |  |  |
| a)  |  |  |   |              |  |  |  |  |  |
| 2. Certified copies of the priority documents have been received in Application No  |  |  |   |              |  |  |  |  |  |
| 3. Copies of the certified copies of the priority documents have been received in this National Stage                             |  |  |   |              |  |  |  |  |  |
| application from the International Bureau (PCT Rule 17.2(a)).   |  |  |   |              |  |  |  |  |  |
| * See the attached detailed Office action for a list of the certified copies not received.  |  |  |   |              |  |  |  |  |  |
|   |  |  |   |              |  |  |  |  |  |
|   |  |  |   |              |  |  |  |  |  |
| Attachmen   | t(s) e of References Cited (PTO-892)   | 4) T Interview S   | ummary (PTO-413)  |              |  |  |  |  |  |
|   | e of References Cited (PTO-092) e of Draftsperson's Patent Drawing Review (PTO-948)  | Paper No(s   | s)/Mail Date  |              |  |  |  |  |  |
| 3) 🔯 Inform   | nation Disclosure Statement(s) (PTO-1449 or PTO/SB/08) r No(s)/Mail Date <u>15</u> .   | 5) Notice of Ir 6) Other:  | nformal Patent Application (PTC<br>   | 9-152)       |  |  |  |  |  |
|   | rademark Office  | ,  |   |              |  |  |  |  |  |

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### **DETAILED ACTION**

### Continued Examination Under 37 CFR 1.114

1. A request for continued examination under 37 CFR 1.114, including the fee set forth in 37 CFR 1.17(e), was filed in this application after final rejection. Since this application is eligible for continued examination under 37 CFR 1.114, and the fee set forth in 37 CFR 1.17(e) has been timely paid, the finality of the previous Office action has been withdrawn pursuant to 37 CFR 1.114. Applicant's submission filed on 12/31/03 has been entered.

## Response to Arguments

2. Applicant's arguments with respect to claims 1-14 have been considered but are moot in view of the new ground(s) of rejection.

# Claim Rejections - 35 USC § 103

- 3. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:
  - (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.
- 4. This application currently names joint inventors. In considering patentability of the claims under 35 U.S.C. 103(a), the examiner presumes that the subject matter of

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the various claims was commonly owned at the time any inventions covered therein were made absent any evidence to the contrary. Applicant is advised of the obligation under 37 CFR 1.56 to point out the inventor and invention dates of each claim that was not commonly owned at the time a later invention was made in order for the examiner to consider the applicability of 35 U.S.C. 103(c) and potential 35 U.S.C. 102(e), (f) or (g) prior art under 35 U.S.C. 103(a).

5. Claims 1-3, 8, and 10-12 are rejected under 35 U.S.C. 103(a) as being unpatentable over Plischke et al. USPN 5977014 in view of Young et al. USPN 5217445.

As to claim 1, Plischke discloses a sanitary absorbent article **40** comprising: an upper layer **50** pervious to liquid; a lower layer **51** impervious to liquid; a transfer layer **42** (col. 16, lines 38-44); and, an absorbing core having an upper part and a lower part, the core is formed from an absorption sheet **41,43** and a superabsorbent material **44** adhered to an inner surface of the sheet. Plischke discloses the sheet comprises two opposite longitudinal sides, each said longitudinal side been bent onto the inner surface (Figure 9). Plischke discloses the sheet serves as supporting means for the superabsorbent material, serves as a distributing means for improving the distribution of applied liquids to be absorbed into the composite structure, and has excellent wet strength (col. 16, lines 11-37). It is old and well known in the art that airlaid and wetlaid webs are used to contain superabsorbent particles in absorbent structures. However, Plischke does not specifically disclose the sheet consists essentially of a wetlaid paper.

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Young teaches wetlaid structures maintain their capillary channels and void spaces better, which allows them to wick body fluids well because they suffer less wet collapse than similar air-laid structures. Young additionally teaches wetlaid webs are significantly stronger than airlaid structures from the standpoint of tensile strength, which brings structural integrity to the web (Young col. 14, lines 2-12). It would have been obvious to one having ordinary skill in the art to modify the absorption sheet of Plischke with a wetlaid web for the benefits taught in Young.

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As to claim 2, Plischke/Young discloses the absorbing core is embossed and perforated (Plischke Figures 15-18).

As to claim 3, see Plischke Figure 17. 3.

As to claim 8, Plischke/Young discloses the superabsorbent material has a Performance under Pressure capacity value of at least about 23 g/g under a confining pressure of 0.7 psi (Plischke col. 24, line 67 through col. 25, line 10).

As to claim 10, Plischke discloses an absorbent core for use in a sanitary absorbent article 40 the core having an upper part and a lower part, the core is formed from an absorption sheet 41,43 and a superabsorbent material 44 adhered to an inner surface of the sheet. The sheet 41,43 and superabsorbent material 44 primarily form the core (Figure 9). Plischke discloses the sheet comprises two opposite longitudinal sides, each said longitudinal side been bent onto the inner surface (Figure 9). Plischke discloses the sheet serves as supporting means for the superabsorbent material, serves

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as a distributing means for improving the distribution of applied liquids to be absorbed into the composite structure, and has excellent wet strength (col. 16, lines 11-37). It is old and well known in the art that airlaid and wetlaid webs are used to contain superabsorbent particles in absorbent structures. However, Plischke does not specifically disclose the sheet consists essentially of a wetlaid paper. Young teaches wetlaid structures maintain their capillary channels and void spaces better, which allows them to wick body fluids well because they suffer less wet collapse than similar air-laid structures. Young additionally teaches wetlaid webs are significantly stronger than airlaid structures from the standpoint of tensile strength, which brings structural integrity to the web (Young col. 14, lines 2-12). It would have been obvious to one having ordinary skill in the art to modify the absorption sheet of Plischke with a wetlaid web for the benefits taught in Young.

As to claim 11, Plischke/Young discloses the absorbing core is embossed and perforated (Plischke Figures 15-18).

As to claim 12, see Plischke Figure 17. 3.

6. Claims 4, 5, 13, and 14 are rejected under 35 U.S.C. 103(a) as being unpatentable over Plischke in view of Young as applied to claims 1 and 10 above and further in view of Hoey et al. USPN 3403681 and further in view of Schreiber USPN 2418907. Plischke/Young discloses the present invention substantially as claimed. However, Plischke/Young does not disclose the absorbent core comprises 2 to 15

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elevations per cm<sup>2</sup> both in the upper part and in the lower part, 2 to 15 perforations per cm<sup>2</sup> both in the upper part and in the lower part. Hoey discloses an apertured absorbent core having apertures spaced at 10 per square inch. Hoey does not disclose the exact aperture range. However, Hoey recognizes the aperture range can be varied and this will affect the liquid distribution and comfort of the pad (Hoey col. 4, lines 14-29). Hoey, therefore recognizes the liquid distribution and comfort of the user is a result effective variable of aperture range. It would have been obvious to one of ordinary skill in the art at the time the invention was made to provide the article of Plischke/Young with the claimed range of apertures, since discovering an optimum value of a result effective variable involves only routine skill in the art.

Plischke/Young/Hoey do not disclose the apertures being present on the upper and lower part of the core. Schreiber discloses an absorbent system with embossed surfaces on upper and lower parts of the core (Figure 3) for the benefit of providing pockets to retain materials in the core (Schreiber col. 4, lines 18-27). It would have been obvious to one having ordinary skill in the art at the time the invention was made to provide the invention of Plischke/Young/Hoey with an embossed surface on the upper and lower parts of the core for the benefits disclosed in Schreiber.

7. Claims 6, 7, and 9 are rejected under 35 U.S.C. 103(a) as being unpatentable over Plischke in view of Young as applied to claim 1 above and further in view of Goldman et al. USPN 5669894.

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As to claims 6 and 9, Plischke/Young does not disclose the superabsorbent material has an absorbency under load value of at least about 24 ml saline per gram of superabsorbent material and a Saline Flow Conductivity value of at least about  $30 \times 10^{-7}$  cm<sup>3</sup> sec/g. Goldman discloses an absorbent article having superabsorbent materials having an absorbency under load value of at least about 24 ml saline per gram of superabsorbent material (col. 4, lines 24-34) and a Saline Flow Conductivity value of at least about  $30 \times 10^{-7}$  cm<sup>3</sup> sec/g (Goldman Abstract) for the purpose of minimizing gel blocking. It would have been obvious to one having ordinary skill in the art at the time the invention was made to incorporate the superabsorbent of Goldman in the invention of Plischke/Young for the benefits disclosed in Goldman.

As to claim 7, Plischke/Young/Goldman do not disclose the superabsorbent material has a porosity of at least about 0.15. the claimed porosity. However, Plischke/Young/Goldman teaches porosity is an important measurement of the effectiveness of the superabsorbent (Goldman col. 13, line 35-63). It is evident that Plischke/Young/Goldman has a value for the porosity. Plischke/Young/Goldman recognizes the porosity can be varied and this will affect the permeability of the article. Plischke/Young/Goldman, therefore recognizes the permeability (SFC) of the superabsorbent layer is a result effective variable of porosity of the superabsorbent. It would have been obvious to one of ordinary skill in the art at the time the invention was made to provide the article of Plischke/Young/Goldman with the claimed porosity, since discovering an optimum value of a result effective variable involves only routine skill in the art.

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## Conclusion

8. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure. Makoui EPO 0359615 is cited to show an absorbent composite formed from superabsorbent material applied directly to a wet laid web, which acts as a supporting structure for the superabsorbent. Holtman USPN 4333463 is cited to show superabsorbent material applied directly to a sheet, which wraps the absorbent core.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Jacqueline F Stephens whose telephone number is (703) 308-8320. The examiner can normally be reached on Monday-Friday 9:00-5:30.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, John Calvert can be reached on (703)305-1025. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

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Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

Jacqueline F Stephens
Examiner
Art Unit 3761

February 7, 2004